## **Alaska Marine Salmon Program**

FY2023 Request: Reference No:

\$1,150,000 63934

n

**AP/AL:** Appropriation

Project Type: Research / Studies / Planning

Category: Development

**Location:** Statewide House District: Statewide (HD 1-40)

Impact House District: Statewide (HD 1-40) Contact: Sam Rabung

Estimated Project Dates: 07/01/2022 - 06/30/2027 Contact Phone: (907)465-6100

### **Brief Summary and Statement of Need:**

The Alaska Marine Salmon Program will research why many systems in Alaska are experiencing poor returns of salmon. While marine fish species are showing lower rates of productivity many species of marine mammals have proliferated. This indicates poor marine survival attributed to changing ocean conditions. The Department cannot tackle these issues alone; however, it is critical the Department have resources to participate in national and international marine research efforts in the Bering Sea and Gulf of Alaska.

Funding:	FY2023	FY2024	FY2025	FY2026	FY2027	FY2028	Total
1004 Gen Fund	\$1,150,000	\$1,150,000	\$1,150,000	\$1,150,000	\$1,150,000		\$5,750,000
Total:	\$1,150,000	\$1,150,000	\$1,150,000	\$1,150,000	\$1,150,000	\$0	\$5,750,000
State Match Required  One-Time Project  Phased - new 0% = Minimum State Match % Required  Amendment					☐ Phased - und ☐ Mental Healt	•	going
Operating & Maintenance Costs:  Project Development:					Amo	ount 0	Staff 0
Ongoing Operating: One-Time Startup:						0 0	0

Totals:

# **Prior Funding History / Additional Information:**

SFCS1 moved to FY23

http://www.legfin.state.ak.us/BudgetReports/LY2022/Capital/SenateFinanceCS1/CapitalProjectDetail ByAgency.pdf

### **Project Description/Justification:**

1. Core program

Cost: \$250,000 Annually

A core marine salmon research program would include supporting the existing staff necessary for basic statewide research and analysis, inclusive of 12 months of Fisheries Scientist 1 (FS1) salary; six months of Fishery Biologist 2 (FB2) salary, with an expectation of an additional six months covered by external funding; and one month of Biometrician 3 salary. An additional month of sea duty pay for each of the FS1 and FB2 would support the ability to participate in field research at sea. Additional funds would support travel for the FS1 and FB2, and the purchasing of supplies and equipment necessary for laboratory analyses (e.g. genetics, otoliths, and stomach content).

### **Alaska Marine Salmon Program**

FY2023 Request: \$1,150,000 Reference No:

63934

2. Support existing long standing research programs: Northern Bering Sea Juvenile Salmon Survey and Southeast Alaska Coastal Monitoring Program.

Cost: \$50,000 each or \$100,000 Annually

These programs have proven valuable for providing forecasting tools used in management and contributing to our understanding of factors driving survival and productivity at different life stages for Yukon River Chinook salmon and Southeast Alaska Pink salmon. Both programs have capacity to provide usable products for other regional salmon species as well (e.g. Western Alaska chum, Southeast Alaska Chinook).

Both programs are largely funded with soft monies and with in-kind contributions from National Oceanic and Atmospheric Administration (NOAA). Additional funds would support laboratory analyses and gear to support ongoing program operations. Annual funding and operation are necessary for accurate forecasts. Additional funds would allow the agency to shore up existing programs in the face of decreasing NOAA support for marine salmon monitoring.

Comprehensive marine salmon monitoring: Southern Bering Sea survey and Northwestern 3. Gulf of Alaska survey

Cost: \$350,000 each or \$800,000 Annually

All three levels would provide a comprehensive assessment of Alaskan salmon at sea for the major salmon stocks. The Southern Bearing Sea survey would include monitoring of Kuskokwim, Bristol Bay, and North Alaskan Peninsula salmon stocks. The Northwestern Gulf of Alaska survey would include monitoring of Cook Inlet, Copper River, and Chignik stocks, with the possibility of some Kodiak stocks also being included. Salmon surveys have previously been conducted by NOAA in these locations and have been successful.

Annual monitoring, stock assessment through genetics and otolith/coded wire tag mark recoveries, and combining with adult abundance data would enable development of forecasting tools like those already developed from Northern Bering Sea and Southeast Coastal Monitoring surveys. Combined, these four programs (Southern Bering Sea survey, Northern Bering Sea Juvenile Salmon Survey, Southeast Alaska Coastal Monitoring Program, and Northwestern Gulf of Alaska survey) would powerfully monitor future salmon runs of importance to Alaskans and allow for better analysis of factors driving Alaskan salmon run abundance patterns. Program costs would largely include funds necessary to charter capable fishing vessels, travel, gear, supplies, laboratory analysis, and support of existing staff in the field.

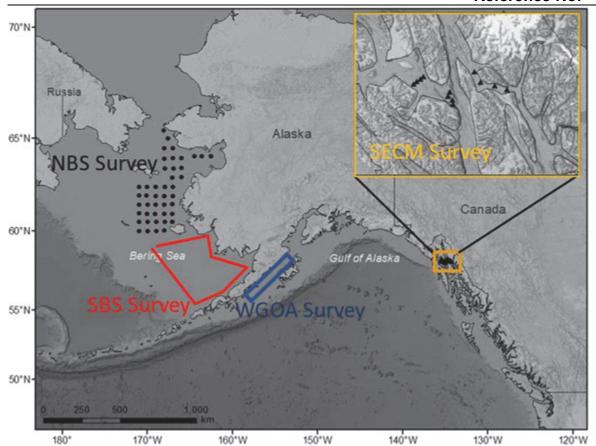


Figure 1. Existing marine salmon monitoring programs (black symbols) in the Northern Bering Sea (NBS Survey) and Southeast Alaska (SECM survey), and priority new programs in the Southern Bering Sea (SBS survey, red) and Western Gulf of Alaska (WGOA survey, blue).